



Resource Adequacy Slice-of-Day Implementation Workshops: RA Counting Rules for Solar

Presentation from SEIA

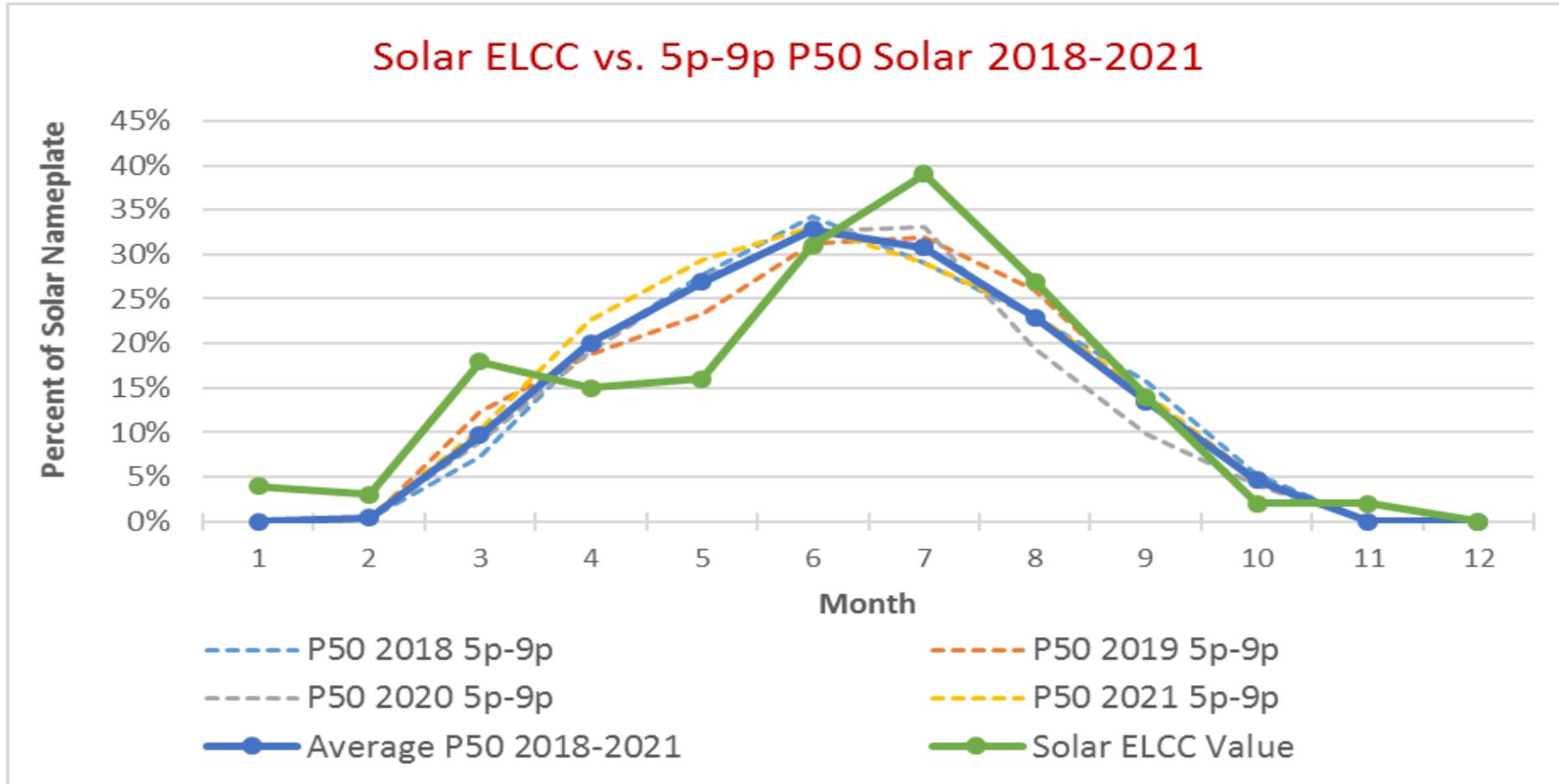
CPUC Docket R. 21-10-002

Tom Beach
Crossborder Energy

July 27, 2022

Solar Exceedance for Net Load Peak Hours (5p-9p)

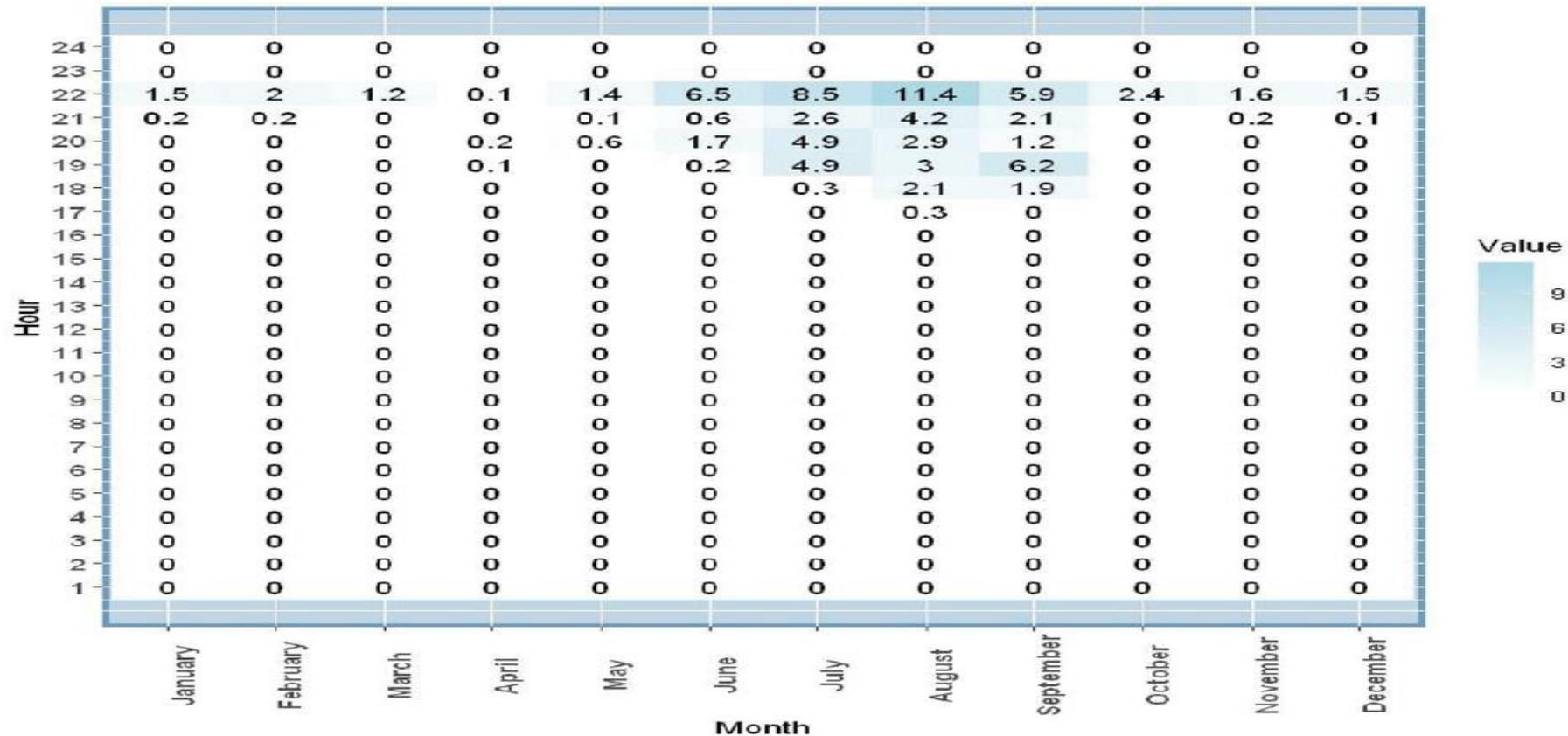
- SEIA/LSA/VS proposed use of P50 (50% exceedance) for solar



New LOLE / ELCC Study

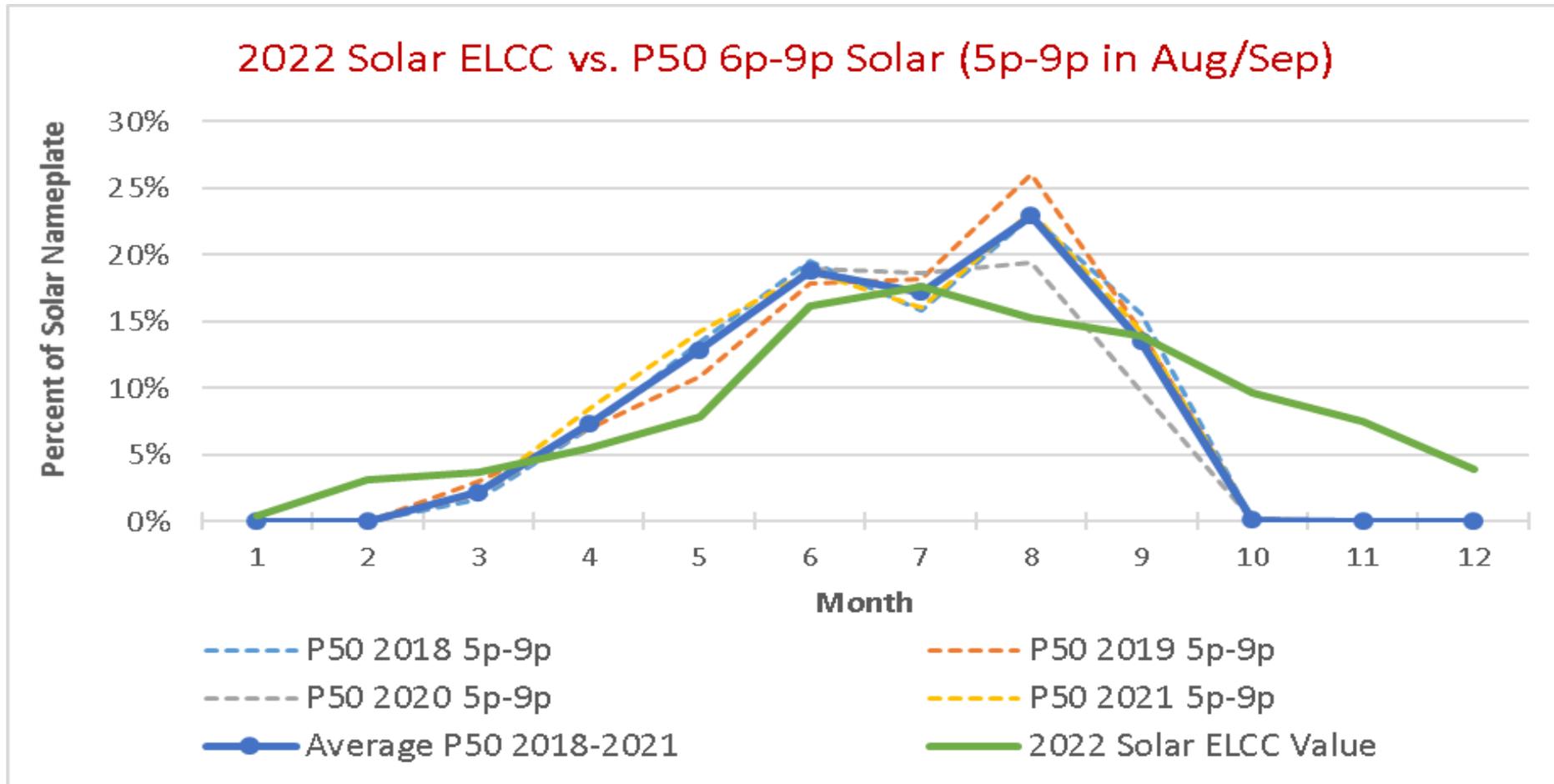
- 6p-9p are the solar production hours with significant EUE / LOLE, except for 5p-9p in August and September

Figure 6: Calibrated LOLE 2024 system Expected Unserved Energy (MWh)



Solar Exceedance vs. 2022 Solar ELCCs

- 50% exceedance solar output 6p-9p (5p-9p in August / September)



SEIA's Review of PG&E's Peak Day Approach

- **Necessary improvements:**
 - Use of historical solar output normalized for the amount of online solar capacity
 - Focus on hours with non-zero EUE
 - SEIA's review of PG&E's data with these changes indicates a solar exceedance in the range of 50% to 60% is reasonable.
- **Possible further improvements:**
 - Broader set of peak day data
 - Fixed vs. tracking systems
 - Regional solar insolation differences (coastal vs. inland)
- **Future research:**
 - Impact of extended cloudy weather in winter months